

A Clear View of the Workforce

New Tools Enable Better Metrics

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Accurate, current, and complete acquisition workforce data is critical in human capital management; and collecting, analyzing, and reporting comprehensive workforce information is vital to shaping, understanding, and developing the Department of Defense's diverse acquisition workforce. For years, multiple challenges have existed in obtaining a clear picture of who makes up the acquisition workforce. Although thoughtful workforce counts have been conducted since the 1980s, the disparate methods of identifying, coding, and collecting acquisition workforce data has made it difficult to accurately capture workforce numbers or to conduct solid analyses and strategies.

There have been previous attempts to better understand the workforce shape and mix, but it is now a top priority of Frank Anderson, director of AT&L Human Capital Initiatives and the president of the Defense Acquisition University. Through effective collaborations with DoD leadership, the department is moving closer to an ability to identify, code, and report increasingly accurate workforce data.

There has not been a dedicated workforce data management team or standard reporting process until now. Under Anderson's leadership and through the support and participation of numerous partners, DAU has developed

The Acquisition Workforce Data Improvement Tool



a network-centric capability that allows increased reliability of data regarding workforce size, certification, experience, and education. This capability continues to evolve, and it provides more granularity to allow DoD to develop strategic and tactical workforce-shaping decisions with increased specificity.

History of Workforce Count

DoD has long sought an effective method to measure the acquisition workforce. In 1986, the Packard Commission used a method known as the Acquisition Organization Workforce Count. At the time, there were 22 DoD organizations identified as acquisition organizations. The Acquisition Organization Workforce Count simply identified every employee within those 22 organizations as a member of the acquisition workforce, regardless of the employee's actual occupational roles and responsibilities.

A Refined Packard approach was applied in May 1997. Using this approach, DoD occupational and organizational data was compiled and analyzed to determine those who should be identified as members of the acquisition workforce, regardless of which DoD organization the individual worked for. The military services and DoD organizations (constituting the 4th Estate) compiled information on an employee's position and qualifications. That manpower and personnel information was sent directly to the De-

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fense Manpower Data Center (DMDC), which oversees DoD's archives of automated manpower, personnel, and training data.

Since 1997, both the Acquisition Organization Workforce Count and the Refined Packard approach have been used to determine who makes up the acquisition workforce. But these methods have not provided a count as accurate or comprehensive as DoD needs in order to develop workforce planning strategies and plans.

Challenges in Obtaining Accurate Numbers

Determined to make workforce decisions based on accurate, current, and correct data, the military services and the 4th Estate began developing separate management information systems. These systems were developed unilaterally, and they functioned independently of each other and the Defense Civilian Personnel Data System (DCPDS). The data maintained in these systems were uploaded into the DMDC warehouse.

When the military services' and the 4th Estate's individual management information systems records were compiled into the DMDC warehouse, there were often widespread errors. The most common error was duplicate records. Since the various information systems were not linked, employees who worked in multiple components would have a record for each component in which they worked. Meaningful analysis of the aggregated data was exceedingly difficult, as was removing duplicate records.

Within DCPDS, similar problems exist. The DCPDS architecture requires human resource specialists to update and maintain records at their office. Those updates flow into a server, referred to as a region. Until recently, the Army and Navy maintained multiple regions, and within the 4th Estate, multiple components could be housed in one region. The problem of multiple regions meant that it was difficult to keep the data updated and refreshed, and there needed to be multiple file updates done through multiple points of contact.

A variety of processes worked against accuracy in DCPDS. For instance, when employees transferred and their records moved to a different region, acquisition data could be lost, or the human resource specialist's unfamiliarity with the requirements of the acquisition career program would result in data elements being dropped out of a record or entered incorrectly. Another challenge was that oftentimes, the job description alone would not identify the acquisition career field in which an employee performed functions. While the expectation is that acquisition workforce employees are given a job code (or job series) that identifies them as being in one career field, the position descriptions for a job often did not facilitate easy identification of the primary duties of the position. For instance, a position may contain duties that fall into systems engi-

neering, information technology, test and evaluation, or contracting. If the primary focus of the position was not clearly identified, the position could be miscoded.

Identifying the Need for Better Metrics

The under secretary of defense for acquisition, technology and logistic's (USD[AT&L]) *Strategic Goals Implementation Plan*, version 2.0, includes an initiative, "Establish a comprehensive workforce analysis and decision-making capability." Additionally, the *AT&L Human Capital Strategic Plan*, version 3.0, released June 2007, recognizes the importance and need of developing a clear picture of the acquisition workforce. Across the department, there is a common need—that of accurate, current, and complete workforce data and a means to collect, maintain, and report this information when necessary. The capability would allow acquisition leaders to:

- Make better decisions regarding workforce management
- Develop consistent and in-depth analyses of the workforce
- Provide on-demand information regarding acquisition workforce demographics, metrics, trend data, and initiatives to those who need to see it.

"High-quality workforce information that is current, accurate, and complete is mandatory for effective human capital management. Without accurate, reliable information, decision makers cannot effectively ensure that the acquisition workforce is adequately staffed and trained," according to the *AT&L Human Capital Strategic Plan*.

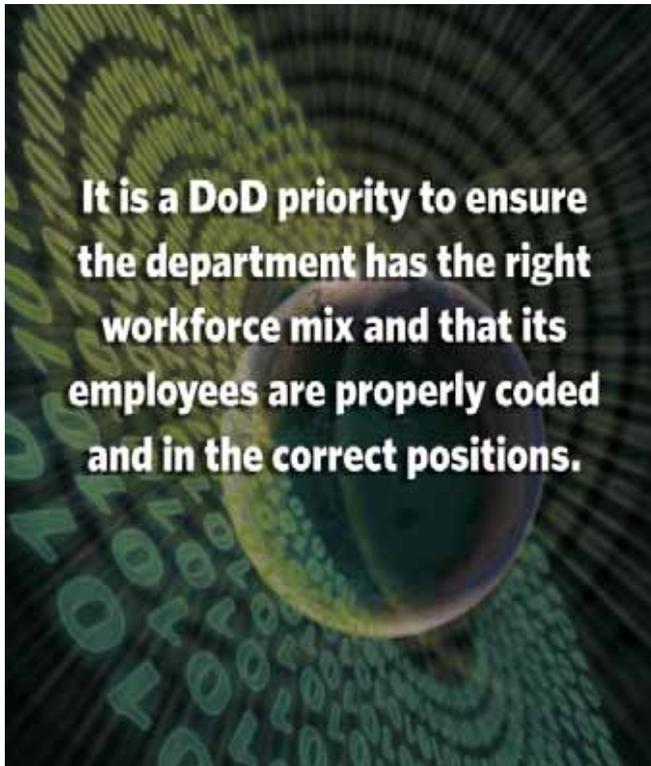
The Strategic Goals Implementation Plan requires that the acquisition community establish business rules for workforce data interface with the organizations/systems storing the information, establish reporting and analysis protocols, and provide a comprehensive workforce analysis.

The need for a clear workforce analysis capability led to the development of the Comprehensive Acquisition Workforce Data Analysis Capability, formerly called the Data Green Initiative.

The Comprehensive Acquisition Workforce Data Analysis Capability

At the heart of the Comprehensive Acquisition Workforce Data Analysis Capability is a tool called the AT&L Workforce DataMart, which was developed from pre-existing commercial-off-the-shelf software owned by DAU. The university imported the acquisition workforce data into the software so it could be used to track career acquisition data.

The AT&L Workforce DataMart essentially serves many purposes. It de-conflicts workforce members who may be claimed by multiple components to provide the most accurate acquisition workforce count to date. The business



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intelligence tools within the AT&L Workforce DataMart provide stakeholders such as the military services, 4th Estate career managers, the functional integrated process teams, and the DoD human capital planners with the capability to run reports to conduct analysis and make strategic decisions regarding the workforce. The data in the AT&L Workforce DataMart is populated with data defined in DoD Instruction 5000.55, Reporting Management Information on DoD Military and Civilian Acquisition Personnel and Position, which was driven by the Defense Acquisition Workforce Improvement Act.

Now that DataMart is established as a tool for workforce data compilation, the military services will provide their acquisition personnel data and submit it via secure file transfer to the DataMart system on a quarterly basis. Acquisition workforce data managers will use DataMart to review those quarterly submissions for accuracy, completeness, standardization, and even potential duplicate entries before the information is sent to DMDC and DCPDS. Thanks to a partnership between DAU and DMDC, once acquisition data has undergone review in DataMart, it is sent directly to the center's warehouse.

"It provides improved interfaces, data handling, and analysis capabilities, and it establishes a consistent, recurring process for data-driven workforce analysis. It fully captures accurate workforce attributes such as size, career field certifications, tenure, and other data elements required to promote effective strategic decisions in the planning, hiring, development, and management of our diverse workforce," said John Young, USD(AT&L).

Eliminating the Middleman

A Web-based application is currently giving workforce data transparency to AT&L 4th Estate workforce members and control to career managers. It also eliminates the requirement for 4th Estate organizations to compile and submit their data on a quarterly basis. The newly developed Acquisition Workforce Data Improvement Tool permits employees, their supervisor, and career managers to view and update their specific acquisition data.

In order to access AWDIT, employees receive a password for the system that allows them to access their personal information. Information recorded in AWDIT includes position data such as organizational code, job series, pay plan, and grade level depending on what is relevant to the employee. Several fields are already populated with data from DCPDS based on what the official human resources and position description records contain. The tool also provides personal data such as the primary, secondary, and tertiary career fields the employee is certified in and what level the employee has obtained in those career fields. The personal data fields also note the acquisition position qualifications of the employee. For instance, it indicates if the employee is a member of the Acquisition Corps as well as the employee's acquisition program indicator (ACAT I or ACAT II, etc.), if applicable.

AWDIT enables employees to review and update their position and personal information on a regular basis. Once the employee has updated and submitted the information, the employee's supervisor receives e-mail notification that the information has been updated. The supervisor reviews the changes and either indicates concurrence or non-concurrence. The employee receives an e-mail notice when the supervisor has reviewed the changes. If the supervisor concurs, the director of the organization's Defense Acquisition Career Management is notified by e-mail of the change and approves or disapproves it. If approved, the data is updated in AWDIT.

Organizations in the 4th Estate such as the Office of the Secretary of Defense, the Defense Information Systems Agency, the Defense Threat Reduction Agency, and the Department of the Defense Education Activity have already implemented AWDIT. DAU data managers have worked with 4th Estate organizations to establish a process that works for each organization. For instance, one organization requested that the supervisory review of information in AWDIT be skipped and go directly to the career manager for approval, and AWDIT was modified to accommodate that request.

Improving the Tool

DoD's goal is to ultimately and with increased certainty be able to access, analyze, and report an accurate, current, and complete summary of the acquisition workforce. DAU is working on a number of initiatives that will improve the

AT&L Workforce DataMart's and AWDIT's ability to create an enterprise-wide solution to developing a complete workforce summary:

- Continue to optimize new opportunities to build and integrate systems and methods to gather and share knowledge across the enterprise.
- Increasing collaboration with and integration of DoD components' workforce management information systems to encourage standardization of information.
- Establishing a partnership with DCPDS to implement initiatives to improve the data updating process for the acquisition information required per DoD Instruction 5000.55.
- Engaging with the Defense Information Military Human Resource System so military personnel information can eventually integrate seamlessly with the AT&L Workforce DataMart.
- Enhancing the self-service utility in MyBiz to allow acquisition personnel the ability to view their acquisition information and to request corrections within MyBiz.

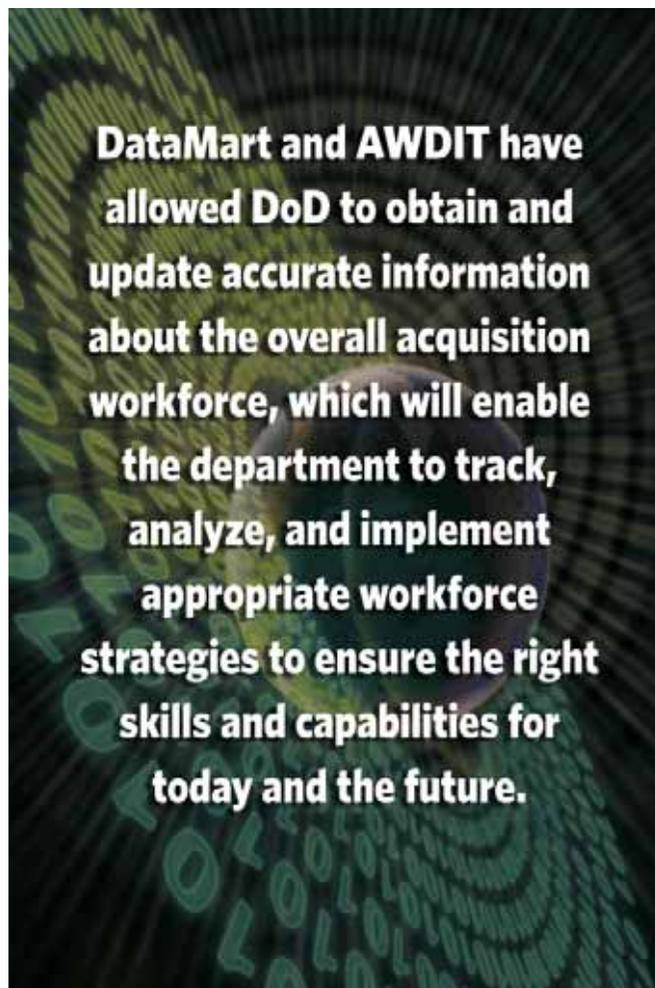
Standardizing Data Requirements

An important part of collecting the data is ensuring standardization of the information. This is being done by developing standard competency models for all 12 Defense Acquisition Workforce Improvement Act career fields in the DoD acquisition workforce. Each career field maps the array of competencies and performance criteria required to be successful in the acquisition career field. The collective goal is to create a common language that will describe workforce capabilities and the criteria required for superior job performance. DoD acquisition functional leaders; component acquisition leaders; field subject matter experts; DAU; and the Center for Naval Analyses, which specializes in competency modeling, have all contributed to this effort, and it is expected to be completed later this year.

The Future Workforce

Through collaboration and participation from the 4th Estate, the DoD acquisition community has established reporting and analysis protocols to improve DoD acquisition workforce analysis and outcomes. The capabilities provide the USD(AT&L) and component leaders with accurate and timely data-driven information to better shape smart workforce decisions that are necessary to recruit and hire people who can become the acquisition community's next leaders.

It is a DoD priority to ensure the department has the right workforce mix and that its employees are properly counted, coded, and in the correct positions. With the Comprehensive Acquisition Workforce Data Analysis Capability, DoD is devoting significant attention to identifying and shaping the acquisition workforce as an enterprise asset, from ensuring the best management of all person-



nel to updating the standard definition of the acquisition workforce. DataMart and AWDIT have allowed DoD to obtain and update accurate information about the overall acquisition workforce, which will enable the department to track, analyze, and implement appropriate workforce strategies to ensure the right skills and capabilities for today and the future. This effort has already improved the reliability, analysis, and transparency of workforce information by updating and standardizing data requirements, creating a centralized data repository, and establishing a consistent, repeatable process for data-driven workforce analysis.

The department must reinvent itself, its processes, and its thinking continuously. It is critical that DoD sees itself as part of a community to neighborhood that comes together as stakeholders around joint projects. Collectively, DoD must embrace human capital initiatives as a critical element to ensure the enterprise succeeds.

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